

[illegible]

PTO/SB/05 (11-00)
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| | |
|------------------------|---|
| Attorney Docket No. | 028420-0013CON |
| First Inventor | P. C. Kocher |
| Title | Cryptographic Computation Using Masking to Prevent .. |
| Express Mail Label No. | EL 728 498 770 US |

(Only for new nonprovisional applications under 37 CFR 1.53(b))

See MPEP chapter 600 concerning utility patent application contents.

ADDRESS TO:

Assistant Commissioner for Patents
Box Patent Application
Washington, D.C. 20231

1. ☒ Fee Transmittal Form (e.g., PTO/SB/17)
(Submit an original, and a duplicate for fee processing)

2. ☐ Applicant claims small entity status.
See 37 CFR 1.27.

3. ☒ Specification [Total Pages (preferred arrangement set forth below)

 - Descriptive title of the invention
 - Cross Reference to Related Applications
 - Statement Regarding Fed sponsored R & D
 - Reference to sequence listing, a table,
or a computer program listing appendix
 - Background of the Invention
 - Brief Summary of the Invention
 - Brief Description of the Drawings (if filed)
 - Detailed Description
 - Claim(s)
 - Abstract of the Disclosure

4. ☒ Drawing(s) (35 U.S.C. 113) [Total

5. Oath or Declaration [Total Pages
 - a. ☐ Newly executed (original or copy)
 - b. ☒ Copy from a prior application (37 CFR 1.63(d))
(for continuation/divisional with Box 18 completed)
 - i. ☐ DELETION OF INVENTOR(S)
Signed statement attached deleting inventor(s)
named in the prior application, see 37 CFR
1.63(d)(2) and 1.33(b).

6. ☐ Application Data Sheet. See 37 CFR 1.76

7. ☐ CD-ROM or CD-R in duplicate, large table or
Computer Program (Appendix)

8. Nucleotide and/or Amino Acid Sequence Submission
(if applicable, all necessary)

 - a. ☐ Computer Readable Form (CRF)
 - b. Specification Sequence Listing on:
 - i. ☐ CD-ROM or CD-R (2 copies); or
 - ii. ☐ paper
 - c. ☐ Statements verifying identity of above copies

ACCOMPANYING APPLICATION PARTS

9. ☐ Assignment Papers (cover sheet & document(s))
10. ☐ 37 CFR 3.73(b) Statement ☒ Power of Attorney
(when there is an assignee) (copy)
11. ☐ English Translation Document (if applicable)
12. ☐ Information Disclosure Statement (IDS)/PTO-1449 ☐ Copies of IDS Citations
13. ☒ Preliminary Amendment
14. ☒ Return Receipt Postcard (MPEP 503)
(Should be specifically itemized)
15. ☐ Certified Copy of Priority Document(s)
(if foreign priority is claimed)
16. ☐ Request and Certification under 35 U.S.C. 122
(b)(2)(B)(i). Applicant must attach form PTO/SB/35
or its equivalent.
17. ☒ Other: Certificate of Mailing

18. If a CONTINUING APPLICATION, check appropriate box, and supply the requisite information below and in a preliminary amendment, or in an Application Data Sheet under 37 CFR 1.76:

☒ Continuation ☐ Divisional ☐ Continuation-in-part (CIP) of prior application No.: **09/324,798**

Prior application information. *Examiner* **J. Darrow**

Group / Art Unit 2132

For CONTINUATION OR DIVISIONAL APPS only: The entire disclosure of the prior application, from which an oath or declaration is supplied under Box 5b, is considered a part of the disclosure of the accompanying continuation or divisional application and is hereby incorporated by reference. The incorporation can only be relied upon when a portion has been inadvertently omitted from the submitted application parts.

19. CORRESPONDENCE ADDRESS

☐ Customer Number or Bar Code Label

or ☒ Correspondence address below

(Insert Customer No. or Attach bar code label here)

| | | | | | |
|---------|--|-----------|----------------|----------|----------------|
| Name | Joseph Yang, Ph.D. | | | | |
| | Skadden, Arps, Slate, Meagher & Flom LLP | | | | |
| Address | 525 University Avenue | | | | |
| | | | | | |
| City | Palo Alto | State | California | Zip Code | 94301 |
| Country | U.S.A. | Telephone | (650) 470-4500 | Fax | (650) 470-4570 |

Name (Print/Type) **Joseph Yang, Ph.D.**

| | |
|-----------------------------------|--------|
| Registration No. (Attorney/Agent) | 41.387 |
|-----------------------------------|--------|

Signature

| | |
|-------------|-----------------|
| <i>Date</i> | August 15, 2001 |
|-------------|-----------------|

Burden Hour Statement: This form is estimated to take 0.2 hours to complete. Time will vary depending upon the needs of the individual case. Any comments on the amount of time you are required to complete this form should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, Washington, DC 20231. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Assistant Commissioner for Patents, Box Patent Application, Washington, DC 20231.

| | | |
|---|-------------------------|--|
| UTILITY PATENT APPLICATION TRANSMITTAL Page 2 | Attorney Docket No.: | 028420-0013CON |
| | First Inventor: | P. C. Kocher et al. |
| | Title: | Cryptographic Computation Using Masking to Prevent Differential Power Analysis and Other Attacks |
| | Express Mail Label No.: | EL 728 498 770 US |

This is a Continuation Application under 37 C.F.R. § 1.53(b) of pending Application Serial No. 09/324,798 filed on June 3, 1999 (which, in turn, claims the benefit of Serial No. 60/087,826 filed June 3, 1998), for DES and Other Cryptographic Processes with Leak Minimization for Smartcards and Other Cryptosystems, by the following named inventors:

- a. Full Name Paul C. Kocher
 Citizenship United States of America
 Residence San Francisco, California
 Address 143 Fillmore Street, San Francisco, California 94117
- b. Full Name Joshua M. Jaffe
 Citizenship United States of America
 Residence San Francisco, California
 Address 200 Upper Terrace, Apt. 4, San Francisco, California 94117
- c. Full Name Benjamin C. Jun
 Citizenship United States of America
 Residence Palo Alto, California
 Address 1081-B Tanlan Drive, Palo Alto, California 94303

1. Enclosed is a copy of prior Application Serial No. 09/324,798 filed on June 3, 1999, including copies of the specification, claims, abstract and the executed oath or declaration as originally filed. Enclosed is a copy of the formal drawings submitted on March 28, 2001 in prior Application Serial No. 09/324,798 filed on June 3, 1999.

2. The filing fee is calculated below:

| | | | | | |
|---------------------------|----|--------------|----------|----|--------|
| Basic Application Fee | | | | \$ | 710.00 |
| Total Claims | 10 | Minus 20 = 0 | x \$18 = | \$ | 0.00 |
| Independent Claims | 3 | Minus 3 = 0 | x \$80 = | \$ | 0.00 |
| Total Application Fee Due | | | | \$ | 710.00 |

3. The Commissioner is hereby authorized to charge any fees under 37 C.F.R. §§ 1.16 and 1.17 that may be required by this paper, and to credit any overpayment, to Deposit Account No. 19-2385. A duplicate of this paper is enclosed.

| | | |
|---|-------------------------|--|
| UTILITY PATENT APPLICATION TRANSMITTAL Page 3 | Attorney Docket No.: | 028420-0013CON |
| | First Inventor: | P. C. Kocher et al. |
| | Title: | Cryptographic Computation Using Masking to Prevent Differential Power Analysis and Other Attacks |
| | Express Mail Label No.: | EL 728 498 770 US |

4. A check in the amount of \$710.00 is enclosed.
5. Cancel in this application original claims 1-40 of the prior application before calculating the filing fee.
6. The prior application is assigned of record to Cryptography Research, Inc., 870 Market Street, Suite 1088, San Francisco, California 94102 (assignment recorded June 3, 1999 at Reel 010010, Frame 0626).
7. A preliminary amendment is enclosed.
8. The power of attorney in the prior application is to:

| | |
|-------------------------------------|--------------------------------------|
| Ronald S. Laurie, Reg. No. 25,431 | Frederick Hadidi, Reg. No. 37,342 |
| Joseph Yang, Ph.D., Reg. No. 41,387 | Thomas Raleigh Lane, Reg. No. 42,781 |

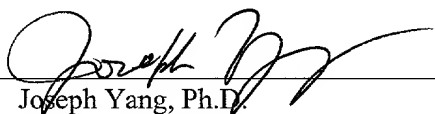
- a. A copy of the power in the prior application is enclosed.
- b. Recognize as Associate Attorney:

| | |
|--|--|
| Frederick D. Kim, Ph.D., Reg. No. 38,513 | Constance F. Ramos, Ph.D., Reg. No. 47,883 |
| Stacey J. Farmer, Ph.D., Reg. No. 42,526 | Gene I. Su, Reg. No. 45,140 |
| Robert B. Beyers, Ph.D., Reg. No. 46,552 | Daniel J. Lin, Reg. No. 47,750 |

- c. Address all future communications to:

Joseph Yang, Ph.D.
 Skadden, Arps, Slate, Meagher & Flom LLP
 525 University Avenue
 Palo Alto, California 94301

Date: August 15, 2001

By: 
 Joseph Yang, Ph.D.
 Registration No. 41,387

Address of signator:

Skadden, Arps, Slate, Meagher & Flom LLP
 525 University Avenue
 Palo Alto, California 94301
 Telephone: (650) 470-4500
 Facsimile: (650) 470-4570

Inventor(s)
 Assignee of complete interest
☒ Attorney or agent of record
 filed under 37 C.F.R. § 1.34(a)

FEE TRANSMITTAL for FY 2000

Patent fees are subject to annual revision.

Complete if Known

| | |
|----------------------|-----------------|
| Application Number | Unknown |
| Filing Date | August 15, 2001 |
| First Named Inventor | P. C. Kocher |
| Examiner Name | J. Darrow |
| Group / Art Unit | 2132 |
| Attorney Docket No. | 028420-0013CON |

TOTAL AMOUNT OF PAYMENT **\$710.00**

METHOD OF PAYMENT (check one)

1. ☒ The Commissioner is hereby authorized to charge indicated fees and credit any overpayments to:

Deposit Account Number **19-2385**
Deposit Account Name **Skadden, Arps et al.**

- ☒ Charge Any Additional Fee Required Under 37 CFR §§ 1.16 and 1.17
☐ Applicant claims small entity status. See 37 CFR § 1.27

2. ☒ Payment Enclosed:

☒ Check ☐ Credit card ☐ Money Order ☐ Other

FEE CALCULATION

1. BASIC FILING FEE

| Large Entity Fee Code | Small Entity Fee Code | Fee Description | Fee Paid |
|-----------------------|-----------------------|------------------------|-----------------|
| 101 710 201 355 | | Utility filing fee | 710.00 |
| 106 320 206 160 | | Design filing fee | |
| 107 490 207 245 | | Plant filing fee | |
| 108 710 208 355 | | Reissue filing fee | |
| 114 150 214 75 | | Provisional filing fee | |
| SUBTOTAL (1) | | | \$710.00 |

2. EXTRA CLAIM FEES

| Total Claims | Extra Claims | Fee from below | Fee Paid |
|--------------------|--------------|----------------|----------|
| 10 | 20** = 0 | X | 0.00 |
| 3 | 3** = 0 | X | 0.00 |
| Multiple Dependent | | | |

**or number previously paid, if greater; For Reissues, see below

| Large Entity Fee Code | Small Entity Fee Code | Fee Description | Fee Paid |
|-----------------------|-----------------------|--|---------------|
| 103 18 203 9 | | Claims in excess of 20 | |
| 102 80 202 40 | | Independent claims in excess of 3 | |
| 104 270 204 135 | | Multiple dependent claim, if not paid | |
| 109 80 209 40 | | ** Reissue independent claims over original patent | |
| 110 18 210 9 | | ** Reissue claims in excess of 20 and over original patent | |
| SUBTOTAL (2) | | | \$0.00 |

FEE CALCULATION (continued)

3. ADDITIONAL FEES

| Large Entity Fee Code | Small Entity Fee Code | Fee Description | Fee Paid |
|-----------------------|-----------------------|--|----------|
| 105 130 205 65 | | Surcharge - late filing fee or oath | |
| 127 50 227 25 | | Surcharge - late provisional filing fee or cover sheet | |
| 139 130 139 130 | | Non - English specification | |
| 147 2,520 147 2,520 | | For filing a request for <i>ex parte</i> reexamination | |
| 112 920* 112 920* | | Requesting publication of SIR prior to Examiner action | |
| 113 1,840* 113 1,840* | | Requesting publication of SIR after Examiner action | |
| 115 110 215 55 | | Extension for reply within first month | |
| 116 390 216 195 | | Extension for reply within second month | |
| 117 890 217 445 | | Extension for reply within third month | |
| 118 1,390 218 695 | | Extension for reply within fourth month | |
| 128 1,890 228 945 | | Extension for reply within fifth month | |
| 119 310 219 155 | | Notice of Appeal | |
| 120 310 220 155 | | Filing a brief in support of an appeal | |
| 121 270 221 135 | | Request for oral hearing | |
| 138 1,510 138 1,510 | | Petition to institute a public use proceeding | |
| 140 110 240 55 | | Petition to revive - unavoidable | |
| 141 1,240 241 620 | | Petition to revive - unintentional | |
| 142 1,240 242 620 | | Utility issue fee (or reissue) | |
| 143 440 243 220 | | Design issue fee | |
| 144 600 244 300 | | Plant issue fee | |
| 122 130 122 130 | | Petitions to the Commissioner | |
| 123 50 123 50 | | Petitions related to provisional applications | |
| 126 240 126 240 | | Submission of Information Disclosure Statement | |
| 581 40 581 40 | | Recording each patent assignment per property (times number of properties) | |
| 146 710 246 355 | | Filing a submission after final rejection (37 CFR § 1.129(a)) | |
| 149 710 249 355 | | For each additional invention to be examined (37 CFR § 1.129(b)) | |
| 179 710 279 355 | | Request for Continued Examination (RCE) | |
| 169 900 169 900 | | Request for expedited examination of a design application | |
| Other fee (specify) | | | |

Reduced by Basic Filing Fee Paid SUBTOTAL (3) **\$710.00**

SUBMITTED BY

| | | | | | |
|-------------------|--------------------|-----------------------------------|--------|-----------|-----------------|
| Name (Print/Type) | Joseph Yang, Ph.D. | Registration No. (Attorney/Agent) | 41,387 | Telephone | (650) 470-4500 |
| Signature | | | | Date | August 15, 2001 |

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CERTIFICATE OF MAILING BY "EXPRESS MAIL" (37 CFR 1.10)Applicant(s): **P. C. Kocher et al.**

Docket No.

028420-0013CON

Serial No.

Unknown

Filing Date

August 15, 2001

Examiner

J. Darrow

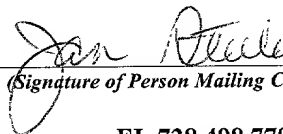
Group Art Unit

2132

Invention:

Cryptographic Computation Using Masking to Prevent Differential Power Analysis and Other AttacksI hereby certify that this **Utility Patent Application Transmittal and all enclosures***(Identify type of correspondence)*

is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under

37 CFR 1.10 in an envelope addressed to: ~~The Assistant~~ Commissioner for Patents, Washington, D.C. 20231 on**August 15, 2001***(Date)***Jan Steele***(Typed or Printed Name of Person Mailing Correspondence)**(Signature of Person Mailing Correspondence)***EL 728 498 770 US***("Express Mail" Mailing Label Number)***Note: Each paper must have its own certificate of mailing.**

Skadden, Arps, Slate, Meagher & Flom LLP
525 University Avenue
Palo Alto, California 94301
United States of America
Telephone: (650) 470-4500
Facsimile: (650) 470-4570